EDUS 516

Team Great Adventure (Nate, Bob, Jarloth & Justine)

Annotated Bibliography

**DVD Selection**

As our DVD selection we have chosen a video by Nasco entitled *Roller Coaster Physics.* A large portion of our lesson is to teach the fundamentals of Physics. Using roller coasters to show Physics in action is the goal. This video serves as a pre-class exercise used to peak interest in the students and excite them for the trip. Roller coasters are so much fun thanks to friction, potential energy, gravity, and acceleration. This video will be used to help the students learn about the wonderful world of applied physics in this presentation. In a segment titled *Roller Coaster Physics*, they’ll strap in and take some terrifying turns on the scariest amusement park attractions in the world. In a segment titled *The Planet Electric*, the physics of motion extends to the creation of electricity. The students will also get to see how electric generators rely on mechanical motion to create electricity. The students get loopy over roller coasters, they’ll be psyched for *Roller Coaster Physics*. It uncovers not only how friction, potential energy, gravity, and acceleration combine to create thrill rides but also how the g-forces of roller coasters affect the human body to make us love – or dread – them. The video includes a teacher’s guide with discussion questions, a lesson plan, vocabulary, and addressed national science standards.